

### ***REMARKS***

This is a full and timely response to the outstanding non-final Office Action mailed April 6, 2009. Reconsideration and allowance of the application and presently pending claims are respectfully requested.

1. Response to Objection of the Drawings

The drawings has been objected to as allegedly failing to comply with 37 CFR 1.84(p)(5) because the specification references character 116 which is allegedly not included in the drawings. In response, Applicant respectfully submits that Fig. 1B contains reference character 116. Therefore, withdrawal of the objection is respectfully requested.

2. Response to Rejection of Claims under 35 U.S.C. § 102

Claims 1, 2, 6, 7, 11, 12, 14, 17-20, 24, 26, 27, 31, 32, 36, and 37 have been rejected under 35 U.S.C. § 102(b) as allegedly being anticipated by *Lebow* (U.S. Patent No. 4,159,222).

a. Claim 1

As provided in independent claim 1, Applicant claims:

A cross-over structure of first and second separate elongate conductive interconnects, comprising:  
a first elongate conductive interconnect;  
a second elongate conductive interconnect comprising:  
a first conductive portion separate from the first elongate conductive interconnect;  
a second conductive portion separate from the first elongate conductive interconnect and the first conductive portion; and  
a third electro-deposited metal portion interconnecting the first and second conductive portions; and  
first insulating material between the first elongate conductive interconnect and the third electro-deposited metal portion of the second elongate interconnect; and  
a substrate, wherein:  
the first insulating material and the third electro-deposited metal portion are positioned between the substrate and the first elongate conductive interconnect; and  
***the second elongate conductive interconnect extends the length of the cross-over structure.***

(Emphasis added).

Applicant respectfully submits that independent claim 1 is allowable for at least the reason that *Lebow* does not disclose, teach, or suggest at least wherein “the second elongate conductive interconnect extends the length of the cross-over structure,” as emphasized above.

Rather, *Lebow* describes a second layer printed circuit pattern 62 encapsulated by insulator 70, 50, as shown in Fig. 7B. Since the second layer does not extend past the insulator materials 70, 50, the second layer printed circuit pattern does not extend the length of the circuit structure shown in Fig. 7B. Therefore, *Lebow* fails to teach or suggest at least wherein “the second elongate conductive interconnect extends the length of the cross-over structure,” as recited in claim 1.

As a result, *Lebow* does not anticipate claim 1, and the rejection of claim 1 should be withdrawn.

b. Claims 2, 6, 7, 11, 12, 14, and 17-20

Dependent claims 2, 6, 7, 11, 12, 14, 17-20 (which depend from independent claim 1) are allowable as a matter of law for at least the reason that the dependent claims 2, 6, 7, 11, 12, 14, 17-20 contain all the features of allowable independent claim 1. For at least this reason, the rejection of claims 2, 6, 7, 11, 12, 14, 17-20 should be withdrawn.

c. Claim 24

As provided in independent claim 24, Applicant claims:

A method of crossing a first elongate conductive interconnect and a separate second elongate conductive interconnect in an integrated circuit, comprising:

- a) forming a first elongate conductive interconnect ;
- b) forming a first conductive portion separate from the first elongate conductive interconnect;
- c) forming a second conductive portion separate from the first elongate conductive interconnect;
- d) depositing first insulating material over at least a portion of the first elongate conductive interconnect; and
- e) electro-depositing metal to form a third electro-deposited metal portion extending over the first insulating material to interconnect the first and second conductive portions and form the second elongate conductive interconnect; and
- f) transferring the structure formed in steps a) to e) to a substrate, ***wherein the second elongate conductive interconnect extends the length of the integrated circuit structure.***

(Emphasis added).

Applicant respectfully submits that independent claim 24 is allowable for at least the reason that *Lebow* does not disclose, teach, or suggest at least “wherein the second elongate conductive interconnect extends the length of the integrated circuit structure,” as emphasized above.

Rather, *Lebow* describes a second layer printed circuit pattern 62 encapsulated by insulator 70, 50, as shown in Fig. 7B. Since the second layer does not extend past the insulator materials 70, 50, the second layer printed circuit pattern does not extend

the length of the circuit structure shown in Fig. 7B. Therefore, *Lebow* fails to teach or suggest at least “wherein the second elongate conductive interconnect extends the length of the cross-over structure,” as recited in claim 24.

As a result, *Lebow* does not anticipate claim 24, and the rejection of claim 24 should be withdrawn.

d. Claims 26, 27, 31, 32, and 36

Dependent claims 26, 27, 31, 32, and 36 (which depend from independent claim 24) are allowable as a matter of law for at least the reason that the dependent claims 1, 26, 27, 31, 32, and 36 contain all the features of allowable independent claim 24. For at least this reason, the rejection of claims 26, 27, 31, 32, and 36 should be withdrawn.

e. Claim 37

As provided in independent claim 37, Applicant claims:

A cross-over structure of first and second conductive means, comprising:

first conductive means;

second conductive means comprising:

a first conductive portion separate from the first conductive means;

a second conductive portion separate from the first conductive means and the first conductive portion; and

a third electro-deposited metal portion interconnecting the first and second conductive portions; and

first insulating means for insulating the first conductive means from the second conductive means ***wherein the first insulating means directly contacts the third electro-deposited metal portion and the second conductive means extends lengthwise across the cross-over structure.***

(Emphasis added).

Applicant respectfully submits that independent claim 37 is allowable for at least the reason that *Lebow* does not disclose, teach, or suggest at least “wherein the first insulating means directly contacts the third electro-deposited metal portion and the second conductive means extends lengthwise across the cross-over structure,” as emphasized above.

Rather, *Lebow* describes a second layer printed circuit pattern 62 encapsulated by insulator 70, 50, as shown in Fig. 7B. Since the second layer does not extend past the insulator materials 70, 50, the second layer printed circuit pattern does not extend the length of the circuit structure shown in Fig. 7B. Therefore, *Lebow* fails to teach or suggest at least “wherein the first insulating means directly contacts the third electro-deposited metal portion and the second conductive means extends lengthwise across the cross-over structure,” as recited in claim 37.

As a result, *Lebow* does not anticipate claim 37, and the rejection of claim 37 should be withdrawn.

### 3. Response to Rejection of Claims under 35 U.S.C. § 103

Claim 23 has been rejected under 35 U.S.C. § 103(a) as allegedly being unpatentable over *Lebow* in view of Official Notice. Applicant traverses the rejection for at least the following reasons.

Claim 23 recites “An active-matrix display, comprising a plurality of cross-overs as claimed in claim 1.” As explained above, claim 1 is patentable over *Lebow*. Since claim 23 depends from independent claim 1, claim 23 is allowable as a matter of law.

Further, regarding the finding of Official Notice, it has not been shown that an active-matrix display comprising the patentable cross-overs of claim 1 is capable of instant and unquestionable demonstration as being well-known” such that the it may be officially noticed.

Per MPEP 2144.03(A), “It would not be appropriate for the examiner to take official notice of facts without citing a prior art reference where the facts asserted to be well known are not capable of instant and unquestionable demonstration as being well-known.” Also, per MPEP 2144.03(B), “If such notice is taken, the basis for such reasoning must be set forth explicitly. The Examiner must provide specific factual findings predicated on sound technical and scientific reasoning to support his or her conclusion of common knowledge.”

As specific factual findings predicated on sound technical and scientific reasoning in support of the conclusion of common knowledge are not provided in the Office Action, the rejections based upon this finding should be withdrawn. Further, under 37 CFR §

1.104(d)(2), if the rejections are based on facts within the personal knowledge of the examiner, “the data should be stated as specifically as possible, and the facts must be supported, when called for by the applicant, by an affidavit from the examiner. Such an affidavit is subject to contradiction or explanation by the affidavits of the applicant and other persons.” Therefore, if this rejection is maintained, Applicant respectfully requests that document(s) be provided as support.

### **CONCLUSION**

For at least the reasons set forth above, Applicant respectfully submits that all objections and/or rejections have been traversed, rendered moot, and/or accommodated, and that the pending claims are in condition for allowance. Favorable reconsideration and allowance of the present application and all pending claims are hereby courteously requested. If, in the opinion of the Examiner, a telephonic conference would expedite the examination of this matter, the Examiner is invited to call the undersigned agent at (770) 933-9500.

Respectfully submitted,

/Charles W. Griggers/  
**Charles W. Griggers**  
**Reg. No. 47,283**